# Overview of Transmission Issues for 33% Renewables by 2020

2008 Energy Report Update Staff Workshop Sacramento, CA

July 23, 2008

Judy Grau
Engineering Office
Energy Facilities Siting Division
jgrau@energy.state.ca.us / 916-653-1610



## 2007 Strategic Transmission Investment Plan Recommendations

- Stakeholders should develop a roadmap for renewables.
- Energy Commission should participate in RETI and vet and integrate results into the next IEPR and Strategic Plan.
- Energy Commission should leverage its power plant licensing and transmission corridor designation authority.

Report available at:

http://www.energy.ca.gov/2007publications/CEC-700-2007-018/CEC-700-2007-018-CMF.PDF



### 2007 Strategic Transmission Investment Plan Recommendations

- Energy Commission should work with CPUC and CAISO to resolve issues associated with the CAISO interconnection queue.
- CPUC should continue to coordinate its generation procurement and transmission CPCN processes.
- CERTS should continue to address means to remove renewables integration barriers.

# Transmission Initiatives Underway to Address Major Barriers

 Renewable Energy Transmission Initiative (RETI)

Website: http://www.energy.ca.gov/reti/index.html

WECC TEPPC 2008 Study Plan

Website:

http://www.wecc.biz/documents/library/board/TEPPC/2008-TEPPC-Synch-Study-Plan-V7-Final.pdf

WGA Western Renewable Energy Zones

Website:

http://www.westgov.org/wga/initiatives/wrez/index.htm



# Transmission Initiatives Underway to Address Major Barriers

- CAISO Interconnection Queue Reform http://www.caiso.com/1f42/1f42c00d28c30.html
- Energy Commission Transmission Corridor Designation

http://www.energy.ca.gov/sb1059/index.html

 CPUC Transmission Investigation I.08-03-010/Rulemaking R.08-03-009

http://docs.cpuc.ca.gov/published/proceedings/I0803010.htm http://docs.cpuc.ca.gov/published/proceedings/R0803009.htm

#### Supporting Initiatives that Address Major Transmission Barriers

DOE Solar Energy Development PEIS

Website: http://www.energy.ca.gov/siting/solar/peis/index.html

 Energy Commission renewable power plant siting cases

Website: http://www.energy.ca.gov/sitingcases/all\_projects.html



#### Supporting Initiatives that Address Major Transmission Barriers

PIER Transmission Research Program

Website:

http://www.energy.ca.gov/research/transmission/index.html

- Separate staff workshop on July 31 Emerging Technologies for Integration of Renewables
- Website: http://www.energy.ca.gov/2008\_energypolicy/documents/index. html#073108



### Supporting Initiatives that Address Major Transmission Barriers

 CPUC rulemaking to continue implementation of CA RPS Program

Website:

http://docs.cpuc.ca.gov/published/proceedings/R0605027.htm

 CPUC rulemaking to integrate and refine procurement policies R.08-02-007

Website:

http://docs.cpuc.ca.gov/published/proceedings/R0802007.htm

Publicly-owned and investor-owned utility initiatives

### Purpose of 2008 and 2009 Energy Report Efforts

 Identify status and progress to date of 2007 IEPR/STIP recommendations

 Develop plan of action/course correction as necessary to direct the 2009 effort



#### California Energy Commission

#### **Next Steps**

- [July 21 staff workshop Impacts of Higher Levels of Renewables on the Electricity System]
- July 29 due date for written comments on today's workshop
- July 31 staff workshop Emerging Technologies for the Integration of Renewables
- August 21 IEPR Committee Workshop: Achieving Higher Levels of Renewables in California's Electricity System
- September 11 Release selected chapters of Committee Draft 2008 IEPR Update
- September 25 IEPR Committee Hearing on selected chapters
- November 3 Release Committee Final 2008 IEPR Update
- November 19 Energy Commission adoption of 2008 IEPR Update